Date: February 25, 2014

Subject: Comments on Preliminary Draft Interim Conceptual Site Model Submission – Preliminary

Draft – Lower Passaic River Study Area (LPRSA)

To: Stephanie Vaughn

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From: Marian Olsen

Program Support Branch

As requested, I reviewed the Preliminary Draft Interim Conceptual Site Model Submission for the Lower Passaic River Study Area (LPRSA). The comments presented below concentrate on those sections of the report related to the human health risk assessment. Based on this review, I have the following comments.

Document Goal. Overall, this document lacks context since typically several sections of this report would be included in the Remedial Investigation/Feasibility Study (RI/FS) report. This document appears to duplicate information that will be included in the final RI/FS. In addition, the Site History section of this report duplicates information provided in the Workplan for the Feasibility Study recently submitted to EPA for review and comment It is recommended that this report provide a clear link to the RI/FS document that is being developed and present the information in a manner that is consistent with RI/FS guidance outline.

Ongoing Work. Several sections of the Conceptual Site Model indicate there is on-going work (i.e., page 18) that will need to be completed before this document will be considered final. Despite the limitations of the available information, throughout the document emphasis is placed on 2,3,7,8-TCDD as the primary contaminant of concern. It is premature to make conclusions regarding the primary contaminants of concern until such time as the RI/FS including the risk assessments are completed and approved by EPA. A preliminary review of the fish and crab data indicates that PCBs and mercury are also contributors to the total cancer risk and noncancer health hazards. It is recommended that the document more clearly explain the various contributors to human health and ecological risks (i.e., PCBs, mercury, and other contaminants).

Pathogens. The document emphasizes (see page 7) risks from exposure to pathogens. Several statements indicate that pathogen risks are significant without identifying the benchmarks that were used in the analysis to make this conclusion. **Ex. 5 - Deliberative Process**

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Land Use. The land use description on page 8 indicates that areas of the Lower Passaic River such as bulkheads and NJ Route 21 are not accessible and not used for catching fish or crabs. As previously indicated by NJDEP, they have observed individuals fishing and accessing the river at Route 21 and the potential exists for individuals such as workers to fish or crab from bulkhead locations where they work. It is recommended that NJDEP's observations be included in the text to more fully describe access to the River. Also, the text indicating that individuals are not fishing in the lower 7 miles based on access be modified to indicate the potential for workers to fish and/or crab at the facilities where they work.

Information provided by NJDEP and the Master plans should be included in this section consistent with the landuse guidance.

Human Health Risk Assessment. Section 4 of the report provides information on risk receptors and exposure pathways indicating that work on the development of the risk assessments for human health and ecological risk are currently ongoing. Based on the current status of this work, it appears to be premature to make conclusions on a document that has not been completed or reviewed by EPA and the Partner Agencies.

Recreational Use of the River. The information presented in this section of the report regarding recreational use of the River are not consistent with the conclusions provided in the Dispute Resolution. The text needs to be modified to recognize the results of the Dispute Resolution.

Fish Ingestion and Creel Angler Surveys. Consistent with the Dispute Resolution the text should describe other surveys that were conducted in the Newark Bay Complex that indicate individuals are consuming fish and crabs from these waters despite the current advisories recommending against these types of activities. In addition, the text needs to provide the site-specific fish and crab consumption rates identified in the Dispute Resolution. The current presentation of information does not reflect the range of studies conducted in these waters and is inconsistent with the goals of identifying risks/hazards to the RME individual.

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The NJDEP Fish Code Regulations have specific definitions and recommendations for "catch and release" (http://www.state.nj.us/dep/fgw/news/2013/fishcode_proposal.htm) that have not been identified for the Lower Passaic River. It is recommended that that term "catch and release" be replaced with individuals not consuming the fish or crabs they caught.

The document should also include recent information provided by NJDEP regarding specific segments of the population that report consumption of carp. In addition, NJDEP has provided information regarding fishing and crabbing by homeless individuals and this site specific information should also be provided in the text. Based on the limited information presented on the CPG's Creel Angler Survey it is difficult to compare the results from that survey with the results from other site-specific surveys outlined in the Dispute Resolution.

Timeframes of Exposure. EPA disagrees with the information presented in Section 4.2 that suggests that all exposures to the river are "hypothetical". As indicated in the Dispute Resolution, and additional

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Reasonable Maximum Exposure. The current text does not indicate that the risk assessment will be developed to evaluate risks and hazards to the Reasonable Maximally Exposed individual consistent with Risk Assessment Guidance for Superfund. Several statements seem to suggest a concern for a population exposure rather than an individual exposure. Consistent with EPA guidance, the risk assessment evaluates risks/hazards to the RME individual and not a population. The text needs to clarify this point.

Recreational Use of the River. The discussion of uses of the River also needs to acknowledge that U-Tube video that indicates adolescents swimming in the River. The text needs to clarify the decisions in the Dispute Resolution regarding the number of days an individual may be exposed during various recreational uses of the river based on age categories identified in the dispute.

Additional Exposure Observations by NJDEP. NJDEP recently provided additional information regarding consumption patterns of the Polish population and other activities along the River. It is recommended that this information be included in the text.

Summary of Site Risks. The report (see page 32) indicates the primary contributor to the cancer risks and noncancer health hazards is 2,3,7,8-TCDD while PCBs and mercury are potential contributors. It is premature to make these conclusions since the risk assessment has not been completed and provided to EPA and the Partner Agencies for review and comment. The conclusions should reflect risks to the Reasonably Maximally Exposed individual as outlined in the Dispute Resolution.

Summary. The summary (page 60) indicates that the LPRSA system is recovering however, the text fails to indicate that fish and crab advisories are still required on the LPRSA and are expected to continue for the foreseeable future since the concentrations of various contaminants in fish and crabs are still above health based levels of concern. It seems premature that a Conceptual Site Model include recommendations and conclusions regarding remedial actions at the site. This information requires further evaluation, as noted throughout these comments and in the RI/FS.

Please let me know if you have any questions.